

## CLAIMS

What is claimed is:

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1. The combination of:  
an appliance;  
means for monitoring the performance of said appliance; and  
means for transmitting data indicative of the status of said appliance from said monitoring means to a facility physically removed from the appliance and the appliance monitoring means.
2. A combination as defined in claim 1 in which the means for monitoring said appliance comprises:  
a data processing and storage means; and  
means for transmitting data from said appliance to said data processing and storage means.
3. A combination as defined in claim 2 in which the means for transmitting data from said appliance to said data processing and storage means comprises a modem and means connecting said modem to a power line servicing said appliance.
4. A combination as defined in claim 1 in which the means for transmitting information from said data processing and storage means to said facility comprises a phone modem.
5. A combination as defined in claim 1 in which the means for monitoring the appliance comprises an integrated unit with multiple user-selectable modes of operation.
6. A combination as defined in claim 5 in which one of said user-selectable modes is a DIAGNOSTIC mode, said integrated unit having the capability with said unit operating in the DIAGNOSTIC mode of displaying a message reporting the status of said appliance.
7. A combination as defined in claim 5 in which:

said integrated unit comprises a module comprising a player for a disc with laser readable data stored thereon;

said integrated unit being operative in one of said multiple modes of operation to read data from said disc and communicate the retrieved data to a person using said integrated unit.

8. A combination as defined in claim 5 in which said integrated unit has a screen and an INTERNET mode of operation in which a user-actuable means is available to establish a connection to the Internet, said integrated unit having means thereafter displaying information obtained from an Internet site on said screen.
9. A combination as defined in claim 5:  
in which said integrated unit comprises a television with a screen;  
said combination comprising a user-actuable means for selecting operation of said system in a television viewing mode.
10. A combination as defined in claim 5 which comprises a remote control for selecting an operating mode of said integrated unit, said remote control having a separate, dedicated control for selecting each operating mode of said appliance.
11. A combination as defined in claim 5 in which said integrated unit is so constructed that, when operation of said unit is switched from one of said modes to a different mode, operation of said integrated unit in said one mode will resume at the point where operation of the integrated unit in said one mode was interrupted.
12. The combination of:  
an appliance; and  
an integrated unit for monitoring said appliance, said integrated unit comprising a screen;  
said integrated unit having an operating system with the capability of powering up said integrated unit to display a message on said screen if a fault arises in said appliance.

13. A system which comprises:

means for monitoring the performance of an appliance; and  
means operable if a fault in the operation of said system occurs for  
communicating the existence and nature of said fault to a service or repair  
facility remote from said appliance.

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14. The combination of:

an appliance; and  
an integrated unit for monitoring said appliance;  
said integrated unit having a screen and an operating system capable of  
causing a display message indicative of a fault in said appliance being  
displayed on said screen when said integrated unit is powered up.

15. The combination of:

an appliance; and  
a unit for monitoring the performance of the said appliance;  
said appliance comprising a sensor for monitoring a parameter indicative of  
the performance of the said appliance; and  
said combination for the comprising:  
means for sampling the data available from said sensor at periodic intervals  
means for transmitting said data to said monitoring unit;  
means for storing said data in memory in said monitoring unit; and  
means for comparing the stored data with reference data and thus identifying  
the nature of the problem if said appliance fails.

16. A combination as defined in claim 15 in which said data is stored in a FIFO  
file, the oldest data being replaced with the newest data after the file is filled.

17. A system which comprises:

a supervisory unit; and  
means for transmitting to said supervisory unit information on an appliance  
associated with said unit;  
said supervisory unit comprising a screen and an operating system for  
displaying on said screen a message reflecting the status of said appliance.

18. A system as defined in claim 17 in which:

said supervisory unit comprises an electrically powered display device in which said screen is incorporated and means for turning said display device on and off; and

the operating system of said supervisory has the capability of turning said display device on and displaying said message if the message is received when said display device is turned off.

19. A system as defined in claim 17 in which:

the operating system of said supervisory unit comprises an electrically operated display device in which said screen is incorporated; and

the operating system of said supervisory unit has the capability of displaying said messages only: (a) if said message display device is turned on when the message is received, or (b) when said display device is subsequently turned on if said message is received when the display device is turned off.

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